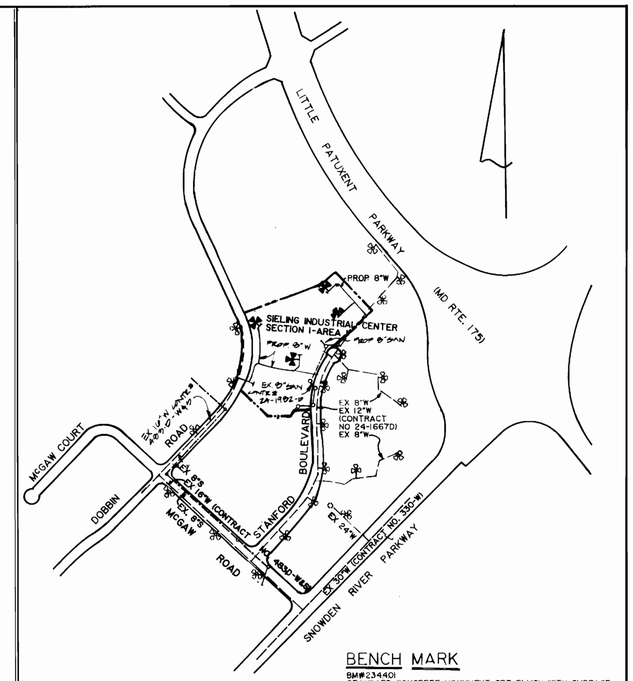
QUANTITIES			
ITEM	ESTIMATED	AS - BUILT	MATERIAL/SUPPLIER
8" 90 (45°) MJ x FL PIPE	6	5	GRIFFIN - BELAIR RD SUPPLY
8" 90 (45°) MJ x MJ BEND	3	3	GRIFFIN - BELAIR RD SUPPLY
8" x 8" TEE	4	4	GRIFFIN - BELAIR RD SUPPLY
8" x 6" TEE	4	1	GRIFFIN - BELAIR RD SUPPLY
8" SLEEVE	2	2	MUELLER - BELAIR RD SUPPLY
8" VALVE	3	8	MUELLER - BELAIR RD SUPPLY
6" VALVE	4	4	MUELLER - BELAIR RD SUPPLY
8" CAP	4	4	GRIFFIN - BELAIR RD SUPPLY
6" FH	4	4	MUELLER - BELAIR RD SUPPLY
8" D.I.P.	1,641 LF	2202 LF	GRIFFIN - BELAIR RD SUPPLY
6" D.I.P.	75 LF	77 LF	GRIFFIN - BELAIR RD SUPPLY
8" SANITARY SEW	21 LF	21 LF	J-M MFG - BELAIR RD SUPPLY
TYPE B DROP LONGLT	1	1 LF	J-M MFG - BELAIR RD SUPPLY



BENCH MARK

BM#23440I
STANDARD CONCRETE MONUMENT SET FLUSH WITH SURFACE
NORTH 491,373.018

BM#23430I
3/4" RB SET 0.3 FT. BELOW THE SURFACE
NORTH 492,140.801

TYPE OF BUILDING: OFFICE/LIGHT MANUFACTURING
DRAINAGE AREA: LITTLE PATUXENT
NO. SHG: 1
NO. WHC: 1
NO. PARCEL: 2
WATER CODE: E06
SEWER CODE: 5333000

LOCATION MAP: SCALE 1"=600'

CONTRACT NO. 24-3065-D
COLUMBIA CORPORATE PARK, PARCEL "A-18" AND "A-19"
A RESUBDIVISION OF PARCEL "A"
SIELING INDUSTRIAL CENTER
SECTION I AREA I
HOWARD COUNTY, MARYLAND

DEPARTMENT OF PUBLIC WORKS

GENERAL NOTES

PART 1

1. APPROXIMATE LOCATION OF EXISTING MAINS ARE SHOWN. THE CONTRACTOR SHALL TAKE ALL NECESSARY PRECAUTIONS TO PROTECT EXISTING MAINS AND SERVICE AND MAINTAIN UNINTERUPTED SUPPLY. ANY DAMAGE INCURRED SHALL BE REPAIRED IMMEDIATELY TO THE SATISFACTION OF THE ENGINEER AT THE CONTRACTOR'S EXPENSE.

2. ALL HORIZONTAL CONTROLS ARE BASED ON MARYLAND STATE COORDINATES.

3. ALL VERTICAL CONTROLS ARE BASED ON U.S.G.S. DATA.

4. ALL PIPE ELEVATIONS ARE INVERT ELEVATIONS.

5. CLEAR ALL UTILITIES BY A MINIMUM OF 6". CLEAR ALL POLES BY 2'-0" MINIMUM OR TUNNEL AS REQUIRED. THE OWNER HAS CONTACTED THE UTILITY COMPANIES AND HAS MADE ARRANGEMENTS FOR BRACING OF POLES AS SHOWN ON THE DRAWINGS. IN THE EVENT THE CONTRACTOR'S WORK REQUIRES THE BRACING OF ADDITIONAL POLES, ANY COST INCURRED BY THE OWNER FOR THE BRACING OF ADDITIONAL POLES, OR DAMAGE SHALL BE DEDUCTED FROM THE MONEY OWED TO THE CONTRACTOR. THE CONTRACTOR SHALL COORDINATE WITH THE UTILITY COMPANIES TO SCHEDULE THE BRACING OF POLES.

6. FOR DETAILS NOT SHOWN ON THE DRAWINGS, AND FOR MATERIALS AND CONSTRUCTION METHODS, USE HOWARD COUNTY DESIGN MANUAL, VOL. IV, STANDARD SPECIFICATIONS AND DETAILS FOR CONSTRUCTION THE CONTRACTOR SHALL HAVE A COPY OF VOL. IV ON THE JOB.

7. WHERE TEST PITS HAVE BEEN MADE ON EXISTING UTILITIES THEY ARE NOTED BY THE SYMBOL AT THE LOCATION OF THE TEST PIT. A NOTE OR NOTES CONTAINING RESULTS OF THE TEST PITS IS INCLUDED ON THE DRAWINGS. EXISTING UTILITIES IN THE VICINITY OF THE PROPOSED WORK FOR WHICH TEST PITS HAVE NOT BEEN DUG SHALL BE LOCATED BY THE CONTRACTOR TWO WEEKS IN ADVANCE OF CONSTRUCTION OPERATIONS AT HIS OWN EXPENSE.

8. CONTRACTOR SHALL NOTIFY THE FOLLOWING UTILITIES OR AGENCIES AT LEAST FIVE WORKING DAYS BEFORE STARTING WORK SHOWN ON THESE PLANS: STATE HIGHWAY ADMINISTRATION 531-5533, BALTO. GAS & ELECTRIC COMPANY – CONTRACTOR SERVICES 850-4620, BALTO. GAS & ELECTRIC COMPANY – UNDERGROUND DAMAGE CONTROL 859-9004, BALTO. GAS & ELECTRIC COMPANY – TROUBLE SHOOTING 296-9001, MISS UTILITY 1-(301) 559-0100, COLONIAL PIPELINE 795-1390 BUREAU OF UTILITIES, HOWARD COUNTY DEPT. OF PUBLIC WORKS 992-2366, C & P TELEPHONE 1-(800) 257-7777.

9. TREES AND SHRUBS ARE TO BE PROTECTED FROM DAMAGE TO MAXIMUM EXTENT. TREES AND SHRUBS LOCATED WITHIN THE CONSTRUCTION STRIP ARE NOT TO BE DAMAGED OR REMOVED BY THE CONTRACTOR.

10. CONTRACTOR SHALL REMOVE TREES, STUMPS, AND ROOTS ALONG THE LINE OF EXCAVATION. PAYMENT FOR SUCH REMOVAL SHALL BE INCLUDED IN THE UNIT PRICE BID FOR CONSTRUCTION OR THE MAIN.

11. PLACE REGULATION "MEN WORKING" WARNING SIGNS AS REQUIRED TO COMPLY WITH MARYLAND STATE HIGHWAY ADMINISTRATIONS MANUAL FOR HIGHWAY CONSTRUCTION AND MAINTENANCE OPERATIONS.

PART 2

1. ALL WATER MAINS TO BE D.I.P. CLASS 52 UNLESS OTHERWISE NOTED.

2. TOPS OF ALL WATER MAINS TO HAVE A MINIMUM OF 3.5 COVER UNLESS OTHERWISE NOTED.

3. VALVES ADJACENT TO TEES SHALL BE STRAPPED TO TEES.

4. ALL FITTINGS SHALL BE BUTTRESSED OR ANCHORED WITH CONCRETE IN ACCORDANCE WITH THE STANDARD DETAILS UNLESS OTHERWISE PROVIDED ON THE DRAWINGS.

5. FIRE HYDRANTS SHALL BE SET TO THE BURY LINE ELEVATION SHOWN ON THE DRAWINGS. ALL FIRE HYDRANTS SHALL BE STRAPPED AND BUTTRESSED WITH CONCRETE IN ACCORDANCE WITH THE STANDARD DETAILS. SOIL ARPOUND THE FIRE HYDRANT SHALL BE COMPACTED IN ACCORDANCE WITH SECTION 1000 AND 1008 OF THE STANDARD SPECIFICATIONS.

6. THE CONTRACTOR SHALL NOT OPERATE ANY WATER MAIN VALVES ON THE EXISTING WATER SYSTEM.

7. ALL WATER HOUSE CONNECTIONS SHALL BE INSIDE METER SETTINGS UNLESS OTHERWISE NOTED.

8. ALL FIRE HYDRANTS TO BE SET THRE FEET BEHIND FACE OF CURB UNLESS NOTED OTHERWISE.

9. ALL WATER HOUSE CONNECTIONS SHALL COMPLY WITH HOWARD CO. STD. 3.21 AS SHOWN ON ART. 40, SPECIAL PROVISIONS.

10. MINIMUM CRIMP RADIUS WILL BE SPECIFIED BY PIPE MANUFACTURER.

11. WATER MAINS AND WATER HOUSE CONNECTION LINES MUST BE PLACED SO AS TO HAVE AT LEAST ONE FOOT SEPARATION FROM THE SEWER MAIN OR SEWER HOUSE CONNECTION AS THEY PASS ABOUT IT.

12. SERVICE CLAMPS ARE TO HAVE STAINLESS STRAPS.

13. ALL D.I.P. FITTINGS SHALL BE ACCORDANCE WITH AWWA SPECIFICATION C-153 DUCTILE IRON COMPACT FITTINGS, 3-INCH THROUGH 12-INCH FOR WATER AND OTHER LIQUIDS.

...

REVIEWED FOR HOWARD SOIL CONSERVATION DISTRICT AND MEETS TECHNICAL REQUIREMENTS.

U.S. SOIL CONSERVATION SERVICES — DATE 9/12/90

THE DEVELOPMENT PLAN IS APPROVED FOR SOIL EROSION AND SEDIMENT CONTROL BY THE HOWARD SOIL CONSERVATION DISTRICT

HOWARD SOIL CONSERVATION DISTRICT — DATE 9/12/90

SEDIMENT CONTROL MEASURES FOR THIS CONTRACT WILL BE IMPLEMENTED IN ACCORDANCE WITH SECTION 219 OF THE STANDARD SPECIFICATIONS AND SDP- 90-130

DEPARTMENT OF PUBLIC WORKS

DIRECTOR OF PUBLIC WORKS — DATE — CHIEF, BUREAU OF UTILITIES — DATE 9-11-90

CHIEF, BUREAU OF ENGINEERING — DATE 9/11/90 — CHIEF, LAND DEVELOPMENT DIV. — DATE 9/11/90

GEORGE WILLIAM STEPHENS, JR. & ASSOCIATES, INC.

658 KENILWORTH DRIVE, SUITE 100
TOWSON, MD. 21204
(301)825-8120

STATE OF MARYLAND — PROFESSIONAL ENGINEER — PE-10730

DESIGNED: N.B.	BY	NO.	REVISIONS	DATE
DRAWN: A.D.				
CHECKED: N.B.				

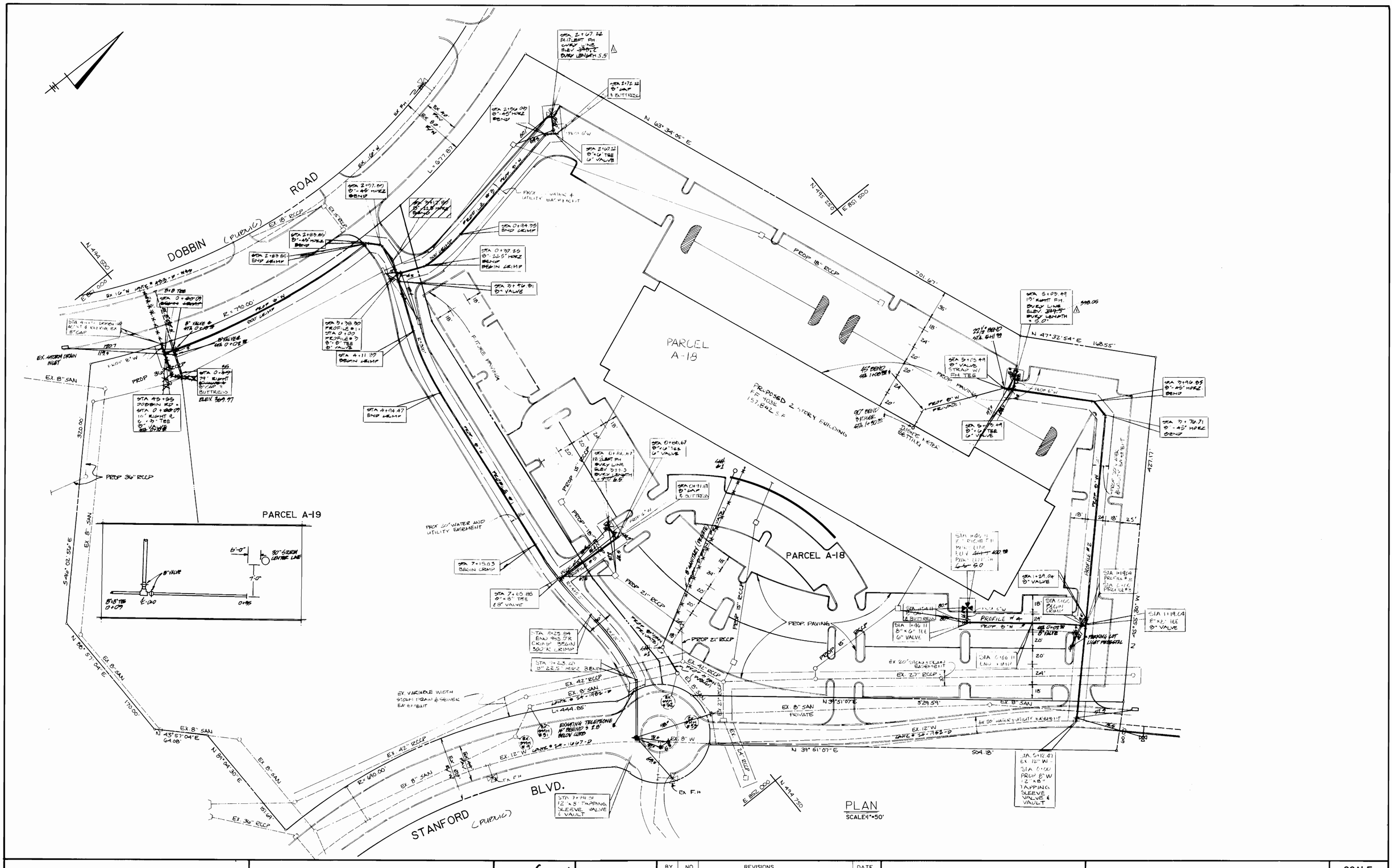
PLAN FOR PROPOSED WATER MAIN
CONTRACT NO. 24-3065-D

COLUMBIA CORPORATE PARK
SECTION I, AREA I, PARCEL A-18 AND A-19
6TH ELECTION DISTRICT
HOWARD COUNTY, MARYLAND
MARCH 28, 1990

SCALE AS SHOWN

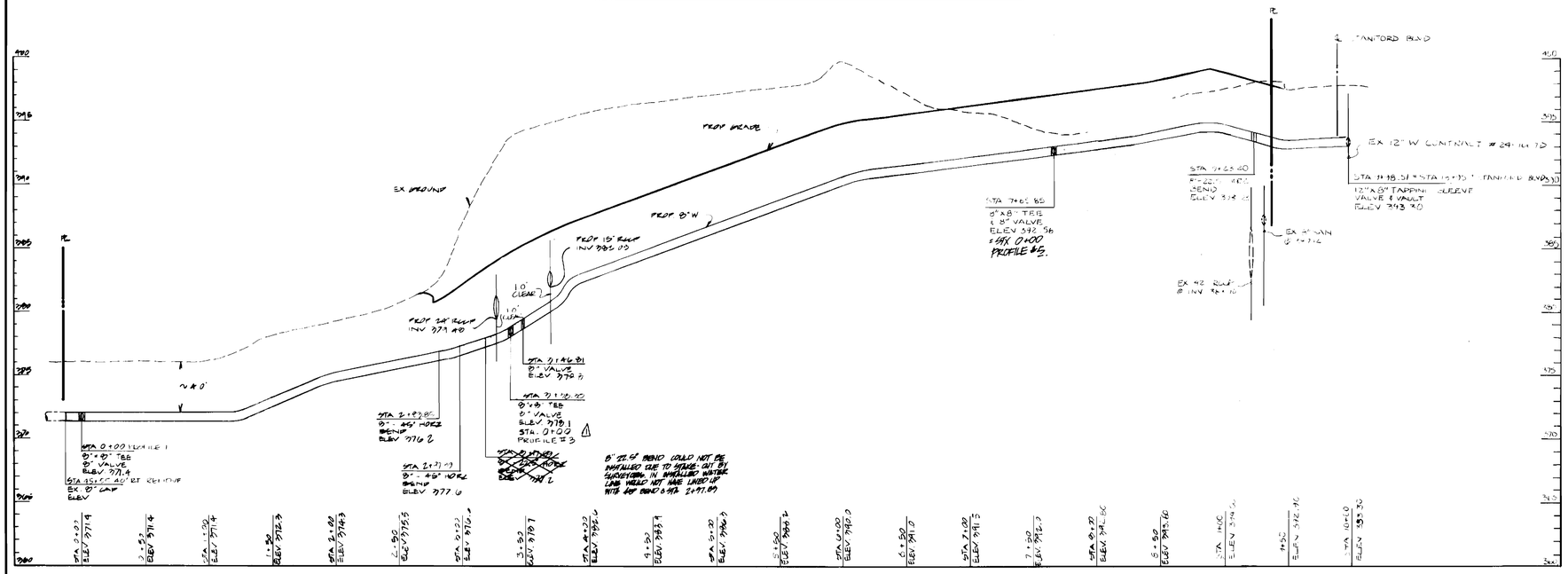
SHEET 1 OF 3

WATER & SEWER "AS BUILTS" 12/24/90

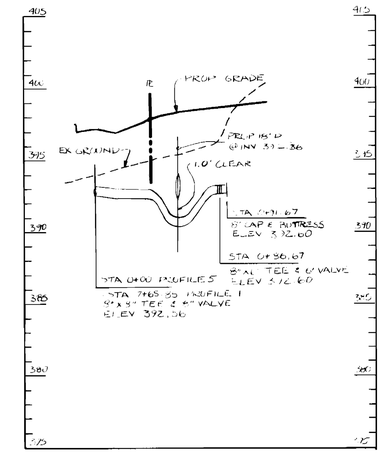


DEPARTMENT OF PUBLIC WORKS	GEORGE WILLIAM STEPHENS, JR. & ASSOCIATES, INC.							
DIRECTOR OF PUBLIC WORKS — DATE 9/26/90; CHIEF, BUREAU OF UTILITIES — DATE 9-11-90	658 KENILWORTH DRIVE, SUITE 100 TOWSON, MD. 21204 (301) 825-8120	DESIGNED: N.B. DRAWN: A.D. CHECKED: N.B.	BY: G.W.S.	NO.: 1	REVISIONS: REV. BURY LINE ELEV. PER STATE HEALTH DEPT COMMENTS (BURY LINE EL STA 4+57.22 PROF. #3, BURY LINE EL STA 5+01.47 PROF. #2	DATE: 10/29/90	PLAN FOR PROPOSED WATER MAIN CONTRACT NO. 24-3065-D	COLUMBIA CORPORATE PARK SECTION 1, AREA 1, PARCEL A-18 AND A-19 6TH ELECTION DISTRICT HOWARD COUNTY, MARYLAND MARCH 28, 1990	SCALE AS SHOWN SHEET 2 OF 3

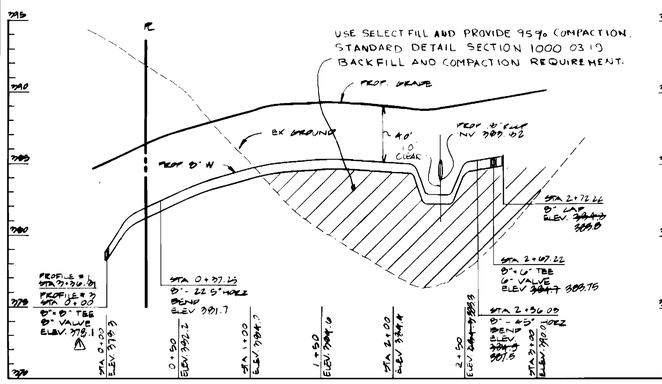
12/20/90 "AS BUILT" WATER & SEWER



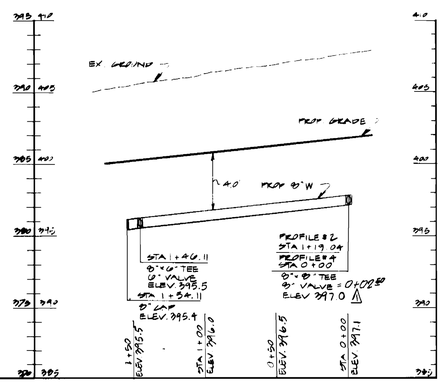
PROFILE # 1 SCALE: HORZ. 1"=50' VERT. 1"=5'



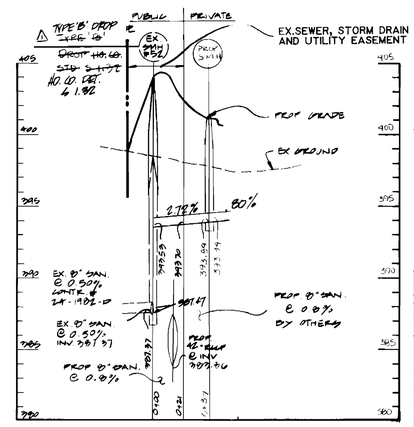
PROFILE #5 SCALE: HORZ. 1"=50' VERT. 1"=5'



PROFILE # 3 SCALE: HORZ. 1"=50' VERT. 1"=5'

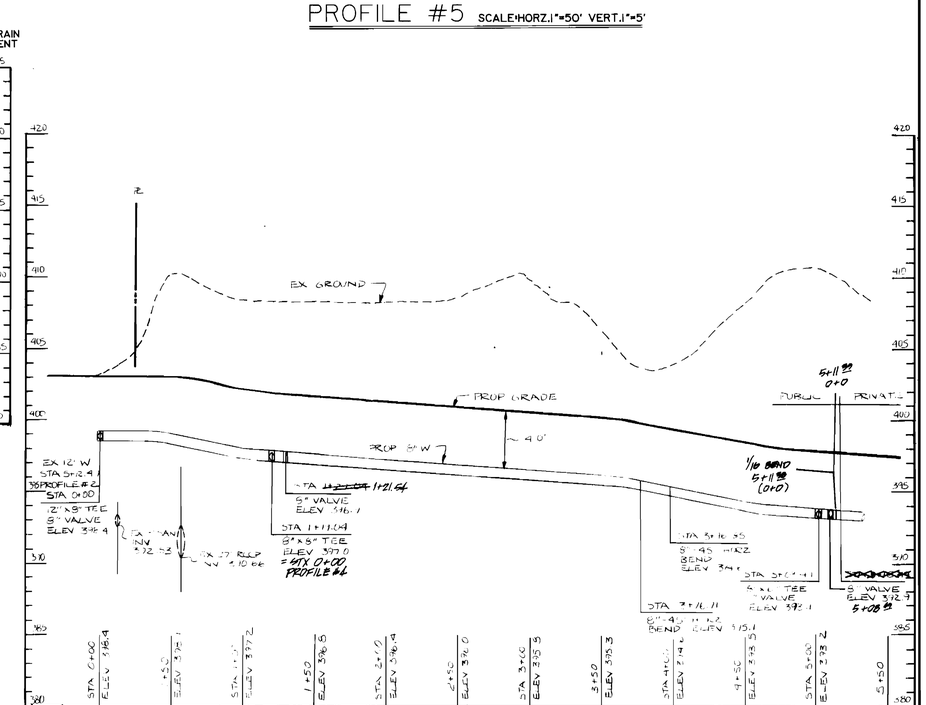


PROFILE # 4 SCALE: HORZ. 1"=50' VERT. 1"=5'



SANITARY SEWER PROFILE

SCALE: HORZ. 1"=50' VERT. 1"=5'



PROFILE #2 SCALE: HORZ. 1"=50' VERT. 1"=5'

REVIEWED FOR HOWARD SOIL CONSERVATION DISTRICT AND MEETS TECHNICAL REQUIREMENTS.	THE DEVELOPMENT PLAN IS APPROVED FOR SOIL EROSION AND SEDIMENT CONTROL BY THE HOWARD SOIL CONSERVATION DISTRICT.	SEDIMENT CONTROL MEASURES FOR THIS CONTRACT WILL BE IMPLEMENTED IN ACCORDANCE WITH SECTION 219 OF THE STANDARD SPECIFICATION AND SDP 90-1990
U.S. SOIL CONSERVATION SERVICES DATE	HOWARD SOIL CONSERVATION DISTRICT DATE	

DEPARTMENT OF PUBLIC WORKS

DIRECTOR OF PUBLIC WORKS DATE — CHIEF, BUREAU OF UTILITIES DATE 9-11-90

CHIEF, BUREAU OF ENGINEERING DATE 9/6/90 — CHIEF, LAND DEVELOPMENT DIV. DATE 9/6/90

GEORGE WILLIAM STEPHENS, JR. AND ASSOCIATES, INC.

658 KENILWORTH DRIVE, SUITE 100
TOWSON, MD. 21204
(301) 825-8120

DESIGNED: N.B.
DRAWN: A.D.
CHECKED:

BY	NO.	REVISIONS	DATE
G.W.S.	1	REV. INVERT ELEV. PER STATE INSPECTOR	
		DEPT COMMENTS (TYPE B DROP INLET,	
		STA 0+00 - STA 3+15.13 PROF. #1, VAULT &	
		STA 0+00 PROF. #2, VAULT & STA 0+00	
		PROF. #4	

PLAN
FOR
PROPOSED WATER MAIN
CONTRACT NO.
24-3065-D

COLUMBIA CORPORATE PARK
SECTION 1, AREA 1, PARCEL A-18 AND A-19

6TH ELECTION DISTRICT
HOWARD COUNTY, MARYLAND
MARCH 28, 1990

SCALE AS SHOWN

SHEET 3 OF 3

"AS BUILTS" WATER & SEWER 12/26/90